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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/893,394	06/29/2001	Katsuto Koyama	109806	6005

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EXAMINER

MAKI, STEVEN D

ART UNIT	PAPER NUMBER
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1733

DATE MAILED: 12/18/2002

4

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Applicati n N .

09/893,394

Applicant(s)

KOYAMA ET AL.

Examin r

Steven D. Maki

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1733

-- The MAILING DATE of this communication appears on the cov r she t with th correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____ .
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____ .
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2 .
- 4) ☐ Interview Summary (PTO-413) Paper No(s). ____ .
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: .

- 1) The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

- 2) Claims 1-11 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 1, it is unclear if the tread rubber at line 10 is the same as or different from the tread rubber at line 3. In claim 1 line 10, it is suggested to insert --made from low electrically conductive rubber-- after "uncured tread rubber".

As to claim 6, it is unclear what additional limitation is being claimed. The subject matter described in claim 6 is inherently required by claim 1.

- 3) Claim 6 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form.

The subject matter described in claim 6 is inherently required by claim 1.

- 4) The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

- 5) The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6) Claims 1-7 are rejected under 35 U.S.C. 102(b) as being anticipated by Japan '917 (JP 10-323917).

Japan '917, directed to an anti-static tire, discloses a method of manufacturing an anti-static pneumatic tire (a tire containing an electrical path for static discharge) comprising:

- providing a partial tire comprising a carcass and a rubber containing belt having an electric resistivity of less than 10^8 ohmxcn;
- winding an uncured conductive strip on the belt wherein the conductive strip comprises rubber and carbon black and has an electric resistivity of less than 10^8 ohmxcn;
- winding an uncured not good conductivity strip on the belt wherein the not good conductivity strip comprises rubber and silica

wherein the wound strips form a tire tread. See figures, abstracts and machine translation, especially paragraphs 7 and 8. The conductive strip forms a conductive member having a height extending from the conductive belt to the road contacting tread surface so that the tire can discharge static electricity.

The "tire material containing a high electrically conductive rubber layer" reads on the electrically conductive rubber containing belt of Japan '917.

The "uncured high electrically conductive rubber ribbon" reads on the uncured conductive carbon black containing rubber strip having an electric resistivity of less than 10^8 ohmxcn.

The "uncured tread rubber [made from low electrically conductive rubber]" reads on the uncured not good conductivity silica containing strip.

As to claim 1, the claimed method is anticipated by the method of Japan '917. With respect to "before or after", it is acknowledged that Japan '917 prefers simultaneously winding the strips. However, Japan '917 teaches that as an alternative to simultaneously winding the strips, the first strip can be wound and then the second strip can be wound. See paragraph 8 of machine translation.

As to claims 2-6, the claimed winding reads on the winding of Japan '917. It is noted that (1) "ribbon" reads on the strip of Japan '917 and (2) "integral extrusion shaped body" reads on the strip of Japan '917. Claims 2-6 fail to require a difference such as width or thickness between the "ribbon" and the "integral extrusion shaped body".

As to claim 7, note the belt of Japan '917 which comprises rubber. One of ordinary skill in the art would also readily understand that the belt of Japan '917 contains cords which are coated by the rubber in order to function as a belt.

7) Claims 1-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Japan '917 (JP 10-323917) in view of at least one of Europe '452 (EP 658452), Europe '903 (EP 925903) and Gerresheim et al (US 5942069) and further in view of Sergel et al (US2001/0035255) and Okada (US 6039826).

Japan '917, which is discussed above, is considered to anticipate claim 1. In any event: As to claim 1, it would have been obvious to wind the low conductivity silica containing strip "before or after" winding the conductive carbon black containing strip so as to form a tread comprising at least one larger volume silica containing tread section and a conductive member extending through the silica containing tread section for the benefit of obtaining better rolling resistance / improved wet grip (due to the silica containing section) and an electrostatic path (due to the conductive member) in view of (1) at least one of Europe '452, Europe '903 and Gerresheim et al's suggestion to forming a tread comprising at least one larger volume silica containing tread section and a conductive member extending through the silica containing tread section for the benefit of obtaining better rolling resistance / improved wet grip (due to the silica containing section) and an electrostatic path (due to the conductive section) and (2) Sergel et al's teaching to **sequentially wind** strips of different composition so as to obtain a tread having a larger volume section of one composition relative to that of the other composition. Sergel et al, like Japan '917, winds a silica containing strip and a carbon black containing strip. Sergel et al teaches that the silica containing section, which may be the larger volume section, improves rolling resistance and wet skid behavior. See paragraph 33. Sergel et al suggests abutting the strips as an alternative to overlapping; it being noted that the conductive member in Europe '452 and Europe '903 abut the silica containing section. It is acknowledged that the conductive member and silica containing section in Europe '452 and Europe '903 are formed by extrusion. However, the conductive and silica containing regions are formed by winding in Japan

'917. Furthermore, one of ordinary skill in the art would have been motivated to continue with Japan '917's teaching to wind (instead of using the alternative technique of extrusion) since Okada provides ample motivation (obtaining high productivity and avoiding splicing of ends) to use winding instead of extrusion.

As to claims 2-6 (winding), the limitations therein would have been obvious in view of Japan '917 and Sergel et al's teachings regarding winding.

As to claim 7 (belt), the limitation therein would have been obvious in view of Europe '452 and/or Europe '903's suggestion to extend the conductive member to the belt. See figure 1 of Europe '452 and figure 18 of Europe '903.

As to claims 8-11 (tread base), the limitations therein would have been obvious in view of (a) Europe '903 and/or Gerresheim et al's suggestion to form a tread of an antistatic tire such that the tread includes a cap, a conductive member extending through the cap, a base, and wings, (b) Japan '917's instruction to form a tread of an anti-static tire by winding and (c) Okada's teaching to use winding to form a tread having a cap and a base.

Remarks

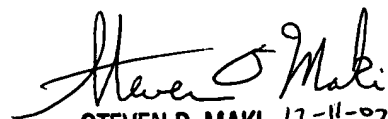
- 8) The remaining references are cited of interest.
- 9) No claim is allowed.
- 10) Any inquiry concerning this communication or earlier communications from the examiner should be directed to Steven D. Maki whose telephone number is 703-308-2068. The examiner can normally be reached on Mon. - Fri. 7:30 AM - 4:00 PM.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Ball can be reached on (703) 308-2058. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9310 for regular communications and (703) 872-9311 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.

Steven D. Maki
December 11, 2002


STEVEN D. MAKI 12-11-02
PRIMARY EXAMINER
GROUP 1300
AU 1733